

Radio Group

Radio Group Component This document outlines the specifications for the `RadioGroupComponent`, a reusable Angular component designed to present a group of radio buttons, allowing users to select a single option from a list of choices.

Purpose ■ The `RadioGroupComponent` provides a user-friendly interface for selecting a single option from a set of mutually exclusive choices presented as radio buttons. It enhances the user experience by organizing options in a logical group and ensuring only one option can be selected at a time.

Usage ■ Integrate the `RadioGroupComponent` into your Angular applications to facilitate the selection of single options from a predefined list presented as radio buttons.

Inputs ■ `options` : (Required) An array of objects representing the options available in the radio group. Each object should have the following properties:

- `value` : (Required) The unique value associated with the option.
- `label` : (Required) The label or display text for the option.
- `selectedValue` : (Optional) The value of the initially selected option. Defaults to null.
- `disabled` : (Optional) Disables all radio buttons in the group if set to true.
- `layout` : (Optional) Specifies the layout orientation of the radio buttons. Possible values: 'horizontal' : Arranges radio buttons horizontally (default). 'vertical' : Arranges radio buttons vertically.

Events ■ `selectionChange` : Fired when the selected option in the radio group changes. Emits the value of the newly selected option.

```
< app-radio-group [options] = "radioOptions" [selectedValue] = "selectedOption" [disabled] = "false" layout = "vertical" (selectionChange) = "onSelectionChange($event)" > </ app-radio-group >
```

Notes ■ Ensure that each option in the options array has a unique value property to distinguish between options. Customize the styling of the radio buttons and their labels to maintain consistency with the overall design of your application. Implement the `selectionChange` event handler to respond to changes in the selected option within the radio group.

// Example data for options

```
radioOptions = [ { value : 'option1' , label : 'Option 1' } , { value : 'option2' , label : 'Option 2' } , { value : 'option3' , label : 'Option 3' } ] ; selectedOption : string | null = 'option2' ; onSelectionChange ( value : string ) { this . selectedOption = value ; }
```

```
<app-radio-group
  [options]="radioOptions"
  [selectedValue]="selectedOption"
  [disabled]="false"
  layout="vertical"
  (selectionChange)="onSelectionChange($event)"
></app-radio-group>
```

```
// Example data for options
radioOptions = [
  { value: 'option1', label: 'Option 1' },
  { value: 'option2', label: 'Option 2' },
  { value: 'option3', label: 'Option 3' }
];

selectedOption: string | null = 'option2';

onSelectionChange(value: string) {
  this.selectedOption = value;
}
```